

Particle Counting System PZG-4

The sample feeder PZG4 with the PC insert board (PCI) and the evaluation software SW-OI and the double piston pump (DPS) are employed for measuring oils and liquids from containers. The representation and storage of measured data is carried out on the PC according to the selected standard. By using the pressure container (pressure dome) with the special Klotz sealing system sample bottles can be very simply degassed by applying vacuum and can then be fed, pressurized through the sensor. The DPS ensures the accurate feed of the medium.

For oils with viscosities of up to 350 mm²/s the LDS 45/50 laser sensor (particle concentrations max. 60.000 particles/ml [$\geq 4\mu\text{m}$]) is employed. For low viscosity liquids measurements can be carried out alternatively with the LDS 30/30 (particle concentrations max. 130,000 particles/ml [$\geq 4\mu\text{m}$]; resolutions <5%).

The SW-OI program allows you to carry out measurements with the sample feeder PZG4. It was specifically designed for measurements of oils. It can carry out evaluations according to ISO 4406, ISO (NIST) and NAS. Average determination, protocol printouts as well as tabular representations are possible. The measuring and flushing volumes can be given in multitudes of 10ml since with every pump stroke exactly 10ml liquid is fed.

A flexible export to Excel for further evaluations and representations is also possible.

Technical Specifications

PZG-4

Lowest measuring volume	:	10 ml – 1000 ml (PZG-4)
Max. viscosity	:	350mm ² /s (pressure 4 bar, laser sensor LDS 45/50)
Pressure/vacuum	:	5 bar (special version 12 bar) / 0 – 0,8 bar depending on compressor
Flow rate	:	25ml – 500ml/min
Power supply	:	230 VAC, 50/60 Hz, 20 W
Dimensions /Weight	:	440 x 230 x 700 (L x W x H) mm / 16 kg

Particle sensors

Model	Flow rate in ml/min	Measuring range in μm with Latex calibration	Cell dimensions in μm	Max. concentration particle/ml
LDS 30/30	30	1 - 50	300 x 300	120 000
LDS 45/50	50	1.5 – 100	450 x 500	25 000
LDS 1/1	200	5 – 500	1 000 x 1 000	4 000
LDS 2/2	1 000	10 – 1 500	2 000 x 2 000	1 000